



IN THE UNITED STATES PATENT AND TRADEMARK OFFICE
Group Art Unit 3651

Patent Application of
William T. Graushar
Application No. 10/747,840
Confirmation No. 6450
Filed: December 29, 2003
Examiner: Patrick Hewey Mackey

“METHOD AND APPARATUS FOR
ASSEMBLING PERSONALIZED ELECTRONIC
MEDIA INTO PRINTED PRODUCTS”

I, Susan Pomeranz, hereby certify that this correspondence is being deposited with the US Postal Service as first class mail in an envelope addressed to Mail Stop Appeal Brief-Patents, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450, on the date of my signature.

Susan Pomeranz
Signature

10-25-2005
Date of Signature

APPEAL BRIEF

Mail Stop Appeal Brief-Patents
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

Sir:

Applicant appeals from the final rejection dated April 21, 2005. Applicant notes that a Notice of Appeal was deposited with the U.S. Postal Service in first class mail on July 21, 2005, and was received by the Patent Office on July 25, 2005. Enclosed with this appeal brief is a one month Request for Extension of Time under 37 CFR 1.136(a), along with the \$110.00 fee required under 37 CFR 1.17(a)(1) extending the time for reply to October 25, 2005. Applicant also encloses a check for \$500.00 in payment of the fee required under 37 CFR 41.20(b)(2). Charge or credit Deposit Account No. 13-3080 with any shortage or overpayment of the above fees.

(1) Real Party in Interest.

The real party in interest is Quad/Graphics, Inc., N63 W23074 Highway 74, Sussex, WI 53089-2827.

(2) Related Appeals and Interferences.

There are no related appeals or interferences.

(3) Status of Claims.

Claims 1-22 are pending and are attached as Appendix A. Claims 5, 10, and 15-20 have been withdrawn by the Examiner. Claims 1-4, 6-9, 11-14, 21, and 22 are rejected by the Examiner. Applicant appeals the rejection of claims 1-4, 6-9, 11-14, 21, and 22.

(4) Status of Amendments.

No amendments have been filed subsequent to the final rejection.

(5) Summary of Claimed Subject Matter.

“Magazine” as used herein generically refers to magazines, books, catalogs, envelopes and other printed materials (pg. 1, lns. 17-18). Magazines are typically assembled through either conventional saddle stitch or perfect binding processes and it should be noted that the present invention may be used in conjunction with saddle stitch, perfect binding or other binding methods (pg. 1, lns. 18-21).

Magazine printers commonly customize magazines by including particular signatures within a magazine based on known characteristics of the recipient (pg. 1, lns. 22-23). This type of customization is known in the print media as selective binding (pg. 1, lns. 23-24). Selective binding is done by selectively placing certain signatures that are stored in different hopper loaders along a binding line onto the binding line such that magazines are assembled based on a recipient’s profile (pg. 1, lns. 24-27).

Magazine printers now go even further in that individual magazines are produced with unique personalized information relating to the magazine’s intended recipient (pg. 1, lns. 28-30). One of the more common ways to personalize a magazine is to have the recipient's identity and address information printed on the cover of the magazine once the magazine is assembled (pg. 1, lns. 30-32). Another method of personalizing magazines relates to printing personalized information onto one or more signatures before the signatures are assembled into respective magazines (pg. 1, lns. 32-34). Signatures are often personalized while they are on the binding line by using an ink jet printer positioned near the binding line (pg. 1, ln. 34 – pg. 2, ln. 2). As

the signatures pass the ink jet printer, personalized information is printed onto one or more of the signatures (pg. 2, lns. 2-3).

As the popularity of CDs has increased, magazine printers have begun inserting CDs into magazines as part of the assembly process (pg. 2, lns. 4-5). Therefore, it would be desirable if the CDs could be incorporated into the personalization process associated with assembling magazines (pg. 2, lns. 5-7).

The invention relates to the assembly of magazines, catalogs, and other printed products. Signatures 19 are assembled on a binding line 12 (pg. 5, ln.18). The binding line 12 includes a plurality of hoppers 14-18 for receiving signatures 19 (pg. 5, lns. 20-24).

In one form of the invention, personalized information is written to a CD 21 by a data writing machine 20 (pg. 5, lns. 33-34). In preferred embodiments, the CD 21 will have generic information pre-burned onto the CD such that the writing machine 20 need only write the additional personalized information on the CD 21 (pg. 6, lns. 4-7). During assembly of the signatures 19 (in this case, the signatures comprise a magazine), the personalized CDs are loaded into a designated hopper from which they are individually selectively deposited into a magazine as directed by the control system 23 (pg. 6, lns. 9-11).

Once the magazine is assembled, the thickness of the magazine is measured, the edges are trimmed by a trimmer 34, and the trimmed magazine are forwarded to a printing area 35 where personalized address indicia is printed on the cover (pg. 6, lns. 24-34). The control system 23 directs a printer 36 to print the personalized address indicia on the CD 21 and/or the magazine cover which corresponds to the personalized information that is written on the CD 21 (pg. 6, ln. 33-pg. 7, ln. 1). The personalized address indicia may be printed on the CD and/or magazine cover while the magazine is still on the binding line 12 or at some other location (pg. 7, lns. 4-6).

The magazines undergo a variety of quality control tests and when a magazine does not pass the quality control tests, rejected magazines are removed from the binding line 12 and delivered to a data-reading machine 38 configured to read the information stored on the CD 21 of the rejected magazine (pg. 7, lns. 7-13). The data-reading machine 38 sends information to the control system 23 which subsequently directs the assembly system to fabricate a replacement magazine into which the CD 21 may be inserted (pg. 7, lns. 13-16).

The CD writing machine 20 can be combined with one or more of the hoppers 14-18 such that a specialized hopper 14A is created which writes personalized information to one, some, or

all of the CDs stored within the hopper (pg. 7, lns. 22-25). During binding, the control system 23 sends a signal to the specialized hopper 14A that directs the hopper 14A to write particular personalized information to a CD 21 and then deliver the CD 21 to the binding line 12 (pg. 7, lns. 25-28). The specialized CD loading hoppers are adapted to assemble the CDs into the magazines in a variety of forms, and the CD 21 may also be assembled on the signature prior to being loaded into a hopper (pg. 7, ln. 31-pg. 8, ln. 4).

In another embodiment, the invention includes a data-reading machine 29 that is adapted to read information stored on one or more CDs 21 (pg. 8, lns. 20-21). The machine 29 transmits the information that is read from the CDs to the control system 23 (pg. 8, lns. 21-23). Based on the information delivered from the machine 29, the control system 23 directs which signatures are selected and assembled into respective personalized magazines on the binding line 12 (pg. 8, lns. 24-27). The CDs 21 may be read and stored remotely from the binding line 12 until they are needed for placement into magazines (pg. 8, lns. 28-30). The CDs 21 are delivered from the storage area 32 when it is time for the CDs 21 to be placed in the magazines (pg. 8, lns. 30-34).

In the embodiment of Fig. 5, the personalized CDs are delivered directly to one of the hoppers 14-18 (pg. 8, ln. 34-pg. 9, ln. 1). The specialized hopper 14A is equipped with the machine 29 that reads the personalized information from the CD 21 and sends the information to the control system 23 (pg. 8, lns. 1-3). Each CD 21 is then assembled into magazines (pg. 8, lns. 3-5). In addition, the information read from the CD 21 may be retained by the control system 23 and used to trigger personalized printing on the signatures, CDs, or magazine cover by the printer 36 (pg. 8, lns. 5-7).

In another form of the invention, the CD 21 may be placed into a queue at one of the hoppers 15-18 that is positioned further down the binding line (pg. 8, lns. 10-11). The CD 21 is read while it is being stored in the queue such that the control system 23 provides instruction to assemble an appropriate magazine which is then matched up to the particular CD for assembly into the proper magazine (pg. 8, lns. 11-14).

(6) Grounds of Rejection to be Reviewed on Appeal.

A. First Ground of Rejection: Whether claims 1, 3, 6, 21, and 22 are anticipated by United States Patent No. 5,388,815 ("Hill '815") under 35 U.S.C. §102(b).

B. Second Ground of Rejection: Whether claims 11, 13, 14, and 22 are anticipated by United States Patent No. 6,431,453 (“Hill ‘453”) under 35 U.S.C. §102(b).

C. Third Ground of Rejection: Whether claims 1-3, 6-7, and 21-22 are obvious over United States Patent No. 6,126,201 (“Pace”) in view of Hill ‘815 under 35 U.S.C. §103(a).

D. Fourth Ground of Rejection: Whether claims 4 and 8-9 are obvious over Pace in view of Hill ‘815 and further in view of United States Patent No. 5,114,128 (“Harris”) under 35 U.S.C. §103(a).

E. Fifth Ground of Rejection: Whether claim 12 is obvious over Hill ‘453 in view of Harris under 35 U.S.C. §103(a).

(7) Argument.

In order to anticipate a reference under 35 U.S.C. §102, a reference must teach every aspect of the claimed invention (M.P.E.P. §706.02). In order to establish a *prima facie* case of obviousness under 35 U.S.C. §103, three basic criteria must be met (M.P.E.P. §706.02(j)). First, there must be some suggestion or motivation, either in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to modify the reference or to combine reference teachings. *Id.* Second, there must be a reasonable expectation of success. *Id.* Finally, the prior art reference (or references when combined) must teach or suggest all the claim limitations. *Id.* The teaching or suggestion to make the claimed combination and the reasonable expectation of success must both be found in the prior art and not based on applicant's disclosure. *Id.* The initial burden is on the examiner to provide some suggestion of the desirability of doing what the inventor has done. *Id.*

Hill ‘815 discloses a credit card package production system 10 that produces embossed and encoded credit cards 30 mounted to carrier forms 26. The system 10 includes an embosser section 20 and an inserter section 24. The embosser section 20 embosses alphanumeric characters 32 on the face of the card 30 and magnetically encodes information on a magnetic stripe 35 on the back of the card 30.

A bar code 27 is used to encode the card account information printed on the carrier forms 26. Once the carrier forms 26 are printed, the forms 26 are sent to a form burster 36. The form burster 36 carries a sensor for reading the code 27 from each carrier form 26. The inserter section 24 inserts the embossed and encoded cards 30 into the printed carrier forms 26. If the information embossed on the card 30 is not correctly prepared or does not match the associated carrier form 26, the card 30 is rejected. Alternatively, preprinted carrier forms with the preprinted carrier account data are sent directly to a form bar code reader 38 and are used for receipt of embossed cards 30.

Hill '453 discloses a smart card verification system 10 for inserting smart cards 30 into corresponding carriers 50 after verifying the card data with a magnetic stripe reader 72, an embossed character reader 74, and IC chip reader 64, a first bar code reader 68 and a back bar code reader 70 with data encoded on the printed carrier 50 that is read with a carrier reader 106. The information is then compared with account data stored in a smart card account data memory 67. If the information does not match, the card is rejected.

At a first reading station 82, the magnetic strip reader 72 and embossed character reader 74 verify the information on the card. If there is a match between the account information from the stripe reader 72 and the character reader 74, a verification controller 66 polls carrier print information from the card and uses the information to control a form printer to print carrier account information on the carriers 50. The card then passes to a second read station including the IC chip reader 64. The information from the chip reader 64 is then compared to the information read from the strip reader 72 and the character reader 74 to determine if there is a match. If so, the card moves to a third reading station including the bar code readers 68, 70. All of the data is compared to determine a match.

Pace discloses a folder 50 for holding a compact disc in a position for binding the folder 50 into a magazine. The folder includes a compact disc assembly 80 having a planar base portion 82, a compact disc 52 supported on one surface 83 of the base portion, and a covering 84. Once the compact disc 52 is positioned within the folder 50, the folder is forwarded to other manufacturers for processing. At no point is information read from or written to the CD in the process disclosed in Pace.

Harris discloses a method and apparatus for incorporating pre-personalized signatures within magazines and books. A pre-personalized signature 16a is deposited on a chain 12, and a

bar code reader 58 reads a bar code. The bar code information is transmitted to an ink jet printer to print name and address information to a magazine cover (see Col. 9, lns. 11-22). The personalized signature is part of the printed product and does not require being associated with another printed product.

A. First Ground of Rejection – 102 Rejection of Claims 1, 3, 6, 21, and 22

I. Claim 1

Claim 1 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, inter alia, a method comprising writing electronic information to an optical disk on a binding line and associating the written optical disk with a printed product on the binding line. More specifically, even if other claims are found to be anticipated by the cited reference, claim 1 is still patentable because there is no teaching or suggestion in Hill '815 of the claimed limitations, as described below in more detail.

Independent claim 1 recites a method including writing electronic information to an optical disk on a binding line, and associating the written optical disk with a printed product on the binding line. Hill '815 does not teach or suggest the subject matter of independent claim 1.

Hill '815 does not teach or suggest writing electronic information to an optical disk on a binding line. Rather, Hill'815 is directed to a card packaging system, where encoded and embossed magnetic credit cards are inserted into carrier forms. The packaging system of Hill '815 is not designed for use with, nor does Hill '815 teach using an optical disk as recited in Applicant's independent claim 1. On page 2, paragraph 2 of the final Office Action, the Examiner identifies reference numeral 36 as being an optical disk. A review of the Hill '815 specification reveals that reference numeral 36 refers to a form burster that carries a sensor for reading a code printed on each carrier form (see Col. 6, lns. 10-16). Applicant respectfully submits that the form burster identified by the Examiner is not an optical disk and is in no way equivalent to the optical disk recited in claim 1.

The term "optical disk" as defined in Applicant's patent application refers to storage devices such as CDs and DVDs (see pg. 5, lns. 11-12). Applicant further differentiates an optical disk from other storage devices such as magnetic media (including floppy disks or cassette tapes) and cards having magnetic strips (see pg. 5, lns. 12-13). Thus, Applicant respectfully disagrees

with the Examiner and submits that nothing in Hill '815 teaches or suggests a method including writing electronic information to an optical disk as there is no optical disk component of the Hill '815 system.

For these reasons, it is submitted that Hill '815 does not teach or suggest the subject matter defined by claim 1. Accordingly, claim 1 is allowable. In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 1 and allowance of claim 1.

II. Claim 3

Claim 3 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, inter alia, that the method further includes printing personalized indicia on the printed product in response to what was written to the optical disk. More specifically, even if the other claims are found to be anticipated in view of the cited reference, claim 3 is still patentable because there is no teaching or suggestion of the claimed limitations, as described below in more detail.

Claim 3 specifies that the method of claim 1 further includes printing personalized indicia on the printed product in response to what was written to the optical disk. The arguments presented above regarding the failure of Hill '815 to teach or suggest the limitations of claim 1 apply with equal weight to claim 3. Rather than re-present the arguments set forth above, Applicant refers to the discussion above for claim 1.

In addition to the arguments set forth above, Hill '815 does not teach or suggest printing personalized indicia based on what was written to the optical disk. Rather, Hill '815 discloses a verification step. Hill '815 prints the carrier form independently of the encoding of the card, and then later, downstream of the encoding, simply verifies that the card and carrier form contain matching information. The carrier form is not printed based on any information on the card. As stated in claim 3, the method of the present invention actually utilizes the information written to the disk to print the personalized indicia on the signature.

For these reasons, Hill '815 does not teach or suggest all of the claim limitations of claim 3. Therefore, it is submitted that claim 3 is allowable.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 3 and allowance of claim 3.

III. Claim 6

Claim 6 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, inter alia, a method comprising reading electronic information from an optical disk on a binding line, and associating the optical disk with a printed product on the binding line. More specifically, even if other claims are found to be anticipated by the cited reference, claim 6 is still patentable because there is no teaching or suggestion in Hill '815 of the claimed limitations, as described below in more detail.

Independent claim 6 recites a method including reading electronic information from an optical disk on a binding line, and associating the optical disk with a printed product on the binding line. Hill '815 does not teach or suggest the subject matter of independent claim 6.

The arguments presented above regarding the failure of Hill '815 to teach or suggest the limitations of claim 1 apply with equal weight to claim 6. Hill '815 simply does not teach or suggest any action upon or gathering information from an optical disk for any purpose.

For these reasons, Hill '815 does not teach or suggest all of the claim limitations of claim 6. Therefore, it is submitted that claim 6 is allowable.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 6 and allowance of claim 6.

IV. Claim 21

Claim 21 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, inter alia, a method comprising writing electronic information to an optical disk on a binding line, delivering a plurality of printed products to the binding line based upon the information written to the optical disk, and associating the printed products and the optical disk on the binding line. More specifically, even if other claims are found to be anticipated by the cited reference, claim 21 is still patentable because there is no teaching or suggestion in Hill '815 of the claimed limitations, as described below in more detail.

Independent claim 21 recites a method comprising writing electronic information to an optical disk on a binding line, delivering a plurality of printed products to the binding line based

upon the information written to the optical disk, and associating the printed products and the optical disk on the binding line.

The arguments presented above regarding the failure of Hill '815 to teach or suggest the limitations of claim 1 apply with equal weight to claim 21. Rather than re-present the arguments set forth above, Applicant refers to the discussion above for claim 1. In addition to the arguments set forth above, Hill '815 does not teach or suggest delivering a plurality of printed products to the binding line based upon information written to an optical disk. As discussed above, magazines are often personalized to the recipient based upon the combination of signatures delivered to the binding line (i.e., selective binding). There is no teaching or suggestion of this type of personalization through selection of printed products to be delivered to a binding line in Hill '815 and thus Hill '815 does not teach or suggest the elements of the claim.

For these reasons, Hill '815 does not teach or suggest all of the claim limitations of claim 21. Therefore, it is submitted that claim 21 is allowable.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 21 and allowance of claim 21.

V. Claim 22

Claim 22 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, inter alia, a method comprising reading electronic information to an optical disk on a binding line, delivering a plurality of printed products to the binding line based upon the information read from the optical disk, and associating the printed products and the optical disk on the binding line. More specifically, even if other claims are found to be anticipated by the cited reference, claim 22 is still patentable because there is no teaching or suggestion in Hill '815 of the claimed limitations, as described below in more detail.

Independent claim 22 recites a method comprising reading electronic information to an optical disk on a binding line, delivering a plurality of printed products to the binding line based upon the information read from the optical disk, and associating the printed products and the optical disk on the binding line.

The arguments presented above regarding the failure of Hill '815 to teach or suggest the limitations of claim 1 apply with equal weight to claim 22. Rather than re-present the arguments set forth above, Applicant refers to the discussion above for claim 1. In addition to the arguments set forth above, Hill '815 does not teach or suggest delivering a plurality of printed products to the binding line based upon information read from an optical disk. As discussed above, magazines are often personalized to the recipient based upon the combination of signatures delivered to the binding line (i.e., selective binding). There is no teaching or suggestion of this type of personalization in Hill '815 and thus Hill '815 does not teach or suggest the elements of the claim.

For these reasons, Hill '815 does not teach or suggest all of the claim limitations of claim 22. Therefore, it is submitted that claim 22 is allowable.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 22 and allowance of claim 22.

B. Second Ground of Rejection – 102 Rejection of Claims 11, 13, 14, and 22

I. Claims 11, 13, and 14

Claims 11, 13, and 14 are patentable separately from the other claims because these claims do not include all the limitations of the other claims and because these claims recite, *inter alia*, a method comprising reading electronic information to an optical disk on a binding line where the optical disk has been electronically written offline with respect to the binding line, and associating the printed products and the optical disk on the binding line. More specifically, even if other claims are found to be anticipated by the cited reference, claims 11, 13, and 14 are still patentable because there is no teaching or suggestion in Hill '453 of the claimed limitations, as described below in more detail.

Independent claim 11 recites a method comprising reading electronic information from an optical disk on a binding line, wherein the optical disk has been electronically written offline with respect to the binding line, and associating the optical disk with a printed product on the binding line. Dependent claim 13 specifies that the method of claim 11 further includes assembling the printed product based upon the information read from the optical disk. Dependent claim 14 specifies that in the method of claim 11, the information read from the

optical disk includes personalized information. Hill '453 does not teach or suggest the subject matter of independent claim 11, nor does Hill '453 teach or suggest the subject matter of claims 13 or 14.

Hill '453 does not teach or suggest reading electronic information to an optical disk on a binding line. Rather, Hill '453 is directed to a smart card verification and insertion system utilizing multiple card readers. The system of Hill '453 is not designed for use with, nor does Hill '453 teach using, an optical disk as recited in Applicant's independent claim 11. On page 2, paragraph 2 of the final Office Action, the Examiner rejects claim 11 based upon Hill '453 but fails to identify the optical disk in the Hill '453 reference. Hill '453 recites a card insertion system that utilizes a magnetic strip reader 72, an embossed character reader 74, an IC chip reader 64, and bar code readers 68, 70 all which verify information programmed onto and embossed into the card 30. Once the information is verified, the card 30 is inserted into a carrier 50. There is neither use of nor teaching of an optical disk in the Hill '453 system.

As discussed above, the term "optical disk" as defined in Applicant's patent application refers to storage devices such as CDs and DVDs (see pg. 5, lns. 11-12). Applicant further differentiates an optical disk from other storage devices such as magnetic media (including floppy disks or cassette tapes) and cards having magnetic strips (see pg. 5, lns. 12-13). Thus, Applicant respectfully disagrees with the Examiner and submits that nothing in Hill '453 teaches or suggests a method including writing electronic information to an optical disk as there is no optical disk component of the Hill '453 system.

For these reasons, it is submitted that Hill '453 does not teach or suggest the subject matter defined by claim 11. Accordingly, claim 11 is allowable. Claims 13 and 14 depend from claim 11 and are thus allowable for the same and other reasons

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claims 11, 13, and 14 and allowance of claims 11, 13, and 14.

II. Claims 22

Claim 22 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, inter alia, a method comprising reading electronic information to an optical disk on a binding line, delivering a plurality of printed products to the binding line based upon the information read from the optical

disk, and associating the printed products and the optical disk on the binding line. More specifically, even if other claims are found to be anticipated by the cited reference, claim 22 is still patentable because there is no teaching or suggestion in Hill '453 of the claimed limitations, as described below in more detail.

Independent claim 22 recites a method comprising reading electronic information to an optical disk on a binding line, delivering a plurality of printed products to the binding line based upon the information read from the optical disk, and associating the printed products and the optical disk on the binding line.

The arguments presented above regarding the failure of Hill '453 to teach or suggest the limitations of claim 11 apply with equal weight to claim 22. Rather than re-present the arguments set forth above, Applicant refers to the discussion above for claim 11. Hill '453 simply does not teach a method as claimed in claim 22 where information is read from an optical disk, nor does Hill '453 teach delivery of printed products to a binding line based upon information read from an optical disk. As discussed above, magazines are often personalized to the recipient based upon the combination of signatures delivered to the binding line (i.e., selective binding). There is no teaching or suggestion of this type of personalization in Hill '453 and thus Hill '453 does not teach or suggest the elements of the claim.

For these reasons, Hill '453 does not teach or suggest all of the claim limitations of claim 22. Therefore, it is submitted that claim 22 is allowable.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 22 and allowance of claim 22.

C. Third Ground of Rejection – 103 Rejection of Claims 1-3, 6, 7, 21, and 22

I. Claims 1 and 2

Claims 1 and 2 are patentable separately from the other claims because these claim do not include all the limitations of the other claims and because these claims recite, inter alia, a method comprising writing electronic information to an optical disk on a binding line and associating the written optical disc with a printed product on the binding line. More specifically, even if other claims are found to be anticipated by the cited reference, claims 1 and 2 are still patentable

because there is no teaching or suggestion of the claimed limitations, as described below in more detail.

Independent claim 1 recites a method including writing electronic information to an optical disk on a binding line, and associating the written optical disk with a printed product on the binding line. Dependent claim 2 recites that in the method of claim 1, the optical disk includes at least one of a CD, CD-ROM, and DVD. Pace does not teach or suggest the subject matter of independent claim 1, and Hill '815 does not cure the deficiencies of Pace.

As acknowledged by the Examiner on page 3, paragraph 5 of the Office Action, Pace discloses a method for associating a CD with a printed product, but does not disclose writing electronic information on a binding line. The Examiner goes on to suggest that Hill discloses writing electronic information on a binding line for the purpose of delivering owner specific electronic media to an account owner, such that it would have been obvious for a person of ordinary skill in the art at the time of the invention to modify Pace by writing electronic information on a binding line for the purpose of delivering owner specific electronic media to the account owner, and cites specifically to Hill '815, col. 7, lines 4-20 for providing the motivation to combine (see pg. 5, paragraph 16 of the Office Action). Applicant respectfully disagrees and submits that the Examiner has failed to make a *prima facie* case of obviousness.

Pace is directed to a method of associating a CD with a printed product, including placing a CD into a package that is glued to a folder, which can then be bound into a printed publication. The CD is preprinted and Pace does not teach or suggest reading or writing information onto the CD while the CD is on the binding line. In fact, once the CD 52 is positioned within the folder 50, information cannot be written to or read from the CD. The folder is forwarded to other manufacturers for processing. There is no suggestion to verify the information on the CD prior to inserting the folder 50 in a signature, nor is there any suggestion to verify the information on the CD at any time during the associating process. The Examiner has failed to show any motivation in the references to modify the method of Pace such that information is written to the CD while on the binding line. The Pace method is for packaging a CD for insertion into a signature regardless of the information contained on the CD and there is no suggestion in Pace to modify the process to write the information on the binding line.

Hill '815 does not cure the deficiencies of Pace. There is no teaching or suggestion to utilize the method of Hill '815 with an optical disk, as discussed above. The Examiner cites col.

7, lines 4-20 of Hill '815 as motivation to modify the device and method of Pace. A review of the cited passage reveals that a critical feature of the Hill '815 system is the verification process to ensure that only correctly embossed and encoded cards are attached to matching carrier forms, and further discusses four separate verification processes that are performed on the cards and the carrier forms. Pace does not require verification, nor does anything in the Pace reference suggest the desirability of implementing a verification process where information is written to the disk on the binding line and then verified for accuracy. There is simply no suggestion to modify Pace as suggested by the Examiner except in Applicant's own disclosure.

Further, as discussed above, the Pace system as taught in the Pace reference would be unable to write information to a disk on the binding line, but rather is designed to package pre-written CDs. To configure the Pace system to be able to write information onto the disks on the binding line, as recited in claim 1, would require a complete redesign of the Pace system, which is simply not taught by either Pace or Hill '815.

For these reasons, it is submitted that neither Pace nor Hill '815 nor the combination of the references teaches or suggests the subject matter defined by claim 1. Accordingly, claim 1 is allowable. Claim 2 depends from claim 1 and is allowable for the same and other reasons.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claims 1 and 2 and allowance of claims 1 and 2.

II. Claim 3

Claim 3 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, *inter alia*, that the method further includes printing personalized indicia on the printed product in response to what was written to the optical disk. More specifically, even if the other claims are found to be anticipated in view of the cited reference, claim 3 is still patentable because there is no teaching or suggestion of the claimed limitations, as described below in more detail.

Claim 3 specifies that the method of claim 1 further includes printing personalized indicia on the printed product in response to what was written to the optical disk. The arguments presented above regarding the failure of Pace or Hill '815 to teach or suggest the limitations of claim 1 apply with equal weight to claim 3. Rather than re-present the arguments set forth above, Applicant refers to the discussion above for claim 1.

In addition to the arguments set forth above, Hill '815 does not teach or suggest printing personalized indicia based on what was written to the optical disk. Rather, Hill '815 discloses a verification step. Hill '815 prints the carrier form independently of the encoding of the card, and then later, downstream of the encoding, simply verifies that the card and carrier form contain matching information. The carrier form is not printed based on any information on the card. As stated in claim 3, the method of the present invention actually utilizes the information written to the disk to print the personalized indicia on the signature. Thus, the combination of Pace and Hill '815 fails to teach each and every element of claim 3.

For these reasons, the references discussed above do not teach or suggest all of the claim limitations of claim 3. Therefore, it is submitted that claim 3 is allowable.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 3 and allowance of claim 3.

III. Claims 6 and 7

Claims 6 and 7 are patentable separately from the other claims because these claims do not include all the limitations of the other claims and because these claims recite, inter alia, a method comprising reading electronic information from an optical disk on a binding line, and associating the optical disk with a printed product on the binding line. More specifically, even if other claims are found to be anticipated by the cited reference, claims 6 and 7 are still patentable because there is no teaching or suggestion of the claimed limitations, as described below in more detail.

Independent claim 6 recites a method including reading electronic information from an optical disk on a binding line, and associating the optical disk with a printed product on the binding line. Dependent claim 7 recites that in the method of claim 6, the optical disk includes at least one of a CD, CD-ROM, and DVD. Pace does not teach or suggest the subject matter of independent claim 6, and Hill '815 does not cure the deficiencies of Pace.

The arguments presented above regarding the failure of Pace and Hill '815 to teach or suggest the limitations of claim 1 apply with equal weight to claim 6. Not only is there no teaching or suggestion in Pace to write electronic information to the disk while the disk is on the binding line, there is also no teaching or suggestion of reading any information from the disk on the binding line. In fact, once the CD is packaged within the folder, information cannot be read

from the CD any longer. There is no suggestion within the references as to why a modification to the Pace system would be necessary to allow for reading of the information on the CD for verification and/or printing purposes as the Pace system is designed for use with preprinted CDs containing only generic information that need not be verified. There is simply no motivation to combine the references, as suggested by the Examiner, outside of Applicant's own disclosure.

For these reasons, neither Pace nor Hill '815 nor the combination of the references teaches or suggests all of the claim limitations of claim 6. Therefore, it is submitted that claim 6 is allowable. Claim 7 depends from claim 6 and is thus allowable for the same and other reasons.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claims 6 and 7 and allowance of claims 6 and 7.

IV. Claim 21

Claim 21 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, inter alia, a method comprising writing electronic information to an optical disk on a binding line, delivering a plurality of printed products to the binding line based upon the information written to the optical disk, and associating the printed products and the optical disk on the binding line. More specifically, even if other claims are found to be anticipated by the cited reference, claim 21 is still patentable because there is no teaching or suggestion of the claimed limitations, as described below in more detail.

Independent claim 21 recites a method comprising writing electronic information to an optical disk on a binding line, delivering a plurality of printed products to the binding line based upon the information written to the optical disk, and associating the printed products and the optical disk on the binding line. Neither Pace nor Hill '815 teach or suggest each of the elements of claim 21.

The arguments presented above regarding the failure of Pace and Hill '815 to teach or suggest the limitations of claim 1 apply with equal weight to claim 21. Rather than re-present the arguments set forth above, Applicant refers to the discussion above for claim 1. In addition to the arguments set forth above, neither Pace nor Hill '815 teaches or suggests delivering a plurality of printed products to the binding line based upon information written to an optical disk.

Pace merely positions a disk in a folder regardless of what information is contained on the disk, and Hill '815 only matches the embossed and encoded card with the carrier form, which already exists on the system 10. There is simply no motivation to modify the system of Pace as suggested by the Examiner other than Applicant's own disclosure.

For these reasons, neither Pace nor Hill '815 nor the combination thereof teaches or suggests all of the claim limitations of claim 21. Therefore, it is submitted that claim 21 is allowable.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 21 and allowance of claim 21.

V. Claim 22

Claim 22 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, inter alia, a method comprising reading electronic information to an optical disk on a binding line, delivering a plurality of printed products to the binding line based upon the information read from the optical disk, and associating the printed products and the optical disk on the binding line. More specifically, even if other claims are found to be anticipated by the cited reference, claim 22 is still patentable because there is no teaching or suggestion of the claimed limitations, as described below in more detail.

Independent claim 22 recites a method comprising reading electronic information to an optical disk on a binding line, delivering a plurality of printed products to the binding line based upon the information read from the optical disk, and associating the printed products and the optical disk on the binding line. Neither Pace nor Hill '815 teach or suggest each of the elements of claim 22.

The arguments presented above regarding the failure of Pace and Hill '815 to teach or suggest the limitations of claim 1 apply with equal weight to claim 22. Rather than re-present the arguments set forth above, Applicant refers to the discussion above for claim 1. In addition to the arguments set forth above, neither Pace nor Hill '815 teaches or suggests delivering a plurality of printed products to the binding line based upon information read from an optical disk. Pace merely positions a disk in a folder regardless of what information is contained on the disk, and Hill '815 only matches the embossed and encoded card with the carrier form, which

already exists on the system 10. There is simply no motivation to modify the system of Pace as suggested by the Examiner other than Applicant's own disclosure.

For these reasons, neither Pace nor Hill '815 nor the combination thereof teaches or suggests all of the claim limitations of claim 22. Therefore, it is submitted that claim 22 is allowable.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 22 and allowance of claim 22.

D. Fourth Ground of Rejection – 103 Rejection of Claims 4, 8, and 9

I. Claim 4

Claim 4 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, inter alia, that the step of printing personalized indicia occurs after associating the optical disk with the printed product. More specifically, even if the other claims are found to be anticipated in view of the cited reference, claim 4 is still patentable because there is no teaching or suggestion of the claimed limitations, as described below in more detail.

Claim 4 specifies that in the method of claim 3, the step of printing personalized indicia occurs after associating the optical disk with the printed product. The arguments presented above regarding the failure of Pace or Hill '815 to teach or suggest the limitations of claim 3 apply with equal weight to claim 4. Rather than re-present the arguments set forth above, Applicant refers to the discussion above for claim 3.

The Examiner rejects claim 4 based upon a combination of Pace, Hill '815, and Harris. Harris does not cure the deficiencies of Pace and Hill '815 as discussed above. Harris also does not teach or suggest printing personalized indicia on the printed product after associating the optical disk with the printed product. Rather, Harris teaches that a pre-personalized signature 16a is deposited on the chain 12 and a bar code reader 58 reads a bar code. The bar code information is then transmitted to an ink jet printer to print the name and address information to a magazine cover. The personalized signature is part of the printed product and is not associated with any other printed products. Thus, the combination of references does not teach or suggest each and every element of claim 4.

Further, Harris cannot be combined with Pace as Harris requires the ability to read a bar code in order to instruct a downstream printer to print appropriate information. The disk in Pace is enclosed within the folder such that information cannot be read from or written to it. The Examiner has failed to put forth the *prima facie* case as there is no motivation to combine the references, as suggested by the Examiner, other than in Applicant's own disclosure. Thus, the combination of references is improper.

For these reasons, the references discussed above do not teach or suggest all of the claim limitations of claim 4. Therefore, it is submitted that claim 4 is allowable.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 4 and allowance of claim 4.

II. Claim 8

Claim 8 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, inter alia, that the method further includes printing personalized indicia on the printed product in response to what was read from the optical disk. More specifically, even if the other claims are found to be anticipated in view of the cited reference, claim 8 is still patentable because there is no teaching or suggestion of the claimed limitations, as described below in more detail.

Claim 8 specifies that the method of claim 6 further includes printing personalized indicia on the printed product in response to what was read from the optical disk. The arguments presented above regarding the failure of Pace or Hill '815 to teach or suggest the limitations of claim 6 apply with equal weight to claim 8. Rather than re-present the arguments set forth above, Applicant refers to the discussion above for claim 6.

Further, Harris does not teach or suggest printing personalized indicia on the printed product in response to what was read from the disk. Harris discloses that a pre-personalized signature is deposited on the chain 12 and a bar code reader reads a bar code on the pre-personalized signature. The bar code information is transmitted to an ink jet printer to print name and address information to a magazine cover. The personalized signature is not an optical disk and is part of the printed product such that it does not require being associated with the printed product.

In addition, there is no motivation or suggestion to combine the references. Harris cannot be combined with Pace as Harris requires the ability to read a bar code in order to instruct a downstream printer to print appropriate information. The disk in Pace is enclosed within the folder such that information cannot be read from or written to it. The Examiner has failed to put forth the *prima facie* case as there is no motivation to combine the references, as suggested by the Examiner, other than in Applicant's own disclosure. Thus, the combination of Pace, Hill '815, and Harris is improper.

For these reasons, the references discussed above do not teach or suggest all of the claim limitations of claim 8. Therefore, it is submitted that claim 8 is allowable.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 8 and allowance of claim 8.

III. Claim 9

Claim 9 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, inter alia, that the step of printing personalized indicia occurs after associating the optical disk with the printed product. More specifically, even if the other claims are found to be anticipated in view of the cited reference, claim 9 is still patentable because there is no teaching or suggestion of the claimed limitations, as described below in more detail.

Claim 9 specifies that in the method of claim 8, the step of printing personalized indicia occurs after associating the optical disk with the printed product. The arguments presented above regarding the failure of Pace or Hill '815 to teach or suggest the limitations of claim 8 apply with equal weight to claim 9. Rather than re-present the arguments set forth above, Applicant refers to the discussion above for claim 8.

Harris does not cure the deficiencies of Pace and Hill '815 as discussed above. Harris also does not teach or suggest printing personalized indicia on the printed product after associating the optical disk with the printed product. Rather, Harris teaches that a pre-personalized signature 16a is deposited on the chain 12 and a bar code reader 58 reads a bar code. The bar code information is then transmitted to an ink jet printer to print the name and address information to a magazine cover. The personalized signature is part of the printed

product and is not associated with any other printed products. Thus, the combination of references does not teach or suggest each and every element of claim 9.

Further, Harris cannot be combined with Pace as Harris requires the ability to read a bar code in order to instruct a downstream printer to print appropriate information. The disk in Pace is enclosed within the folder such that information cannot be read from or written to it. The Examiner has failed to put forth the *prima facie* case as there is no motivation to combine the references, as suggested by the Examiner, other than in Applicant's own disclosure. Thus, the combination of references is improper.

For these reasons, the references discussed above do not teach or suggest all of the claim limitations of claim 9. Therefore, it is submitted that claim 9 is allowable.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 9 and allowance of claim 9.

E. Fifth Ground of Rejection – 103 Rejection of Claim 12

Claim 12 is patentable separately from the other claims because this claim does not include all the limitations of the other claims and because this claim recites, inter alia, that the method further includes printing personalized information on the printed product in response to what was read from the optical disk. More specifically, even if the other claims are found to be anticipated in view of the cited reference, claim 12 is still patentable because there is no teaching or suggestion of the claimed limitations, as described below in more detail.

Claim 12 specifies that the method of claim 11 further includes printing personalized information on the printed product in response to what was read from the optical disk. The arguments presented above regarding the failure of Hill '453 to teach or suggest the limitations of claim 11 apply with equal weight to claim 12. Rather than re-present the arguments set forth above, Applicant refers to the discussion above for claim 11.

Harris does not cure the deficiencies of Hill '453. Further, Harris does not teach or suggest printing personalized indicia on the printed product in response to what was read from the disk. Harris discloses that a pre-personalized signature is deposited on the chain 12 and a bar code reader reads a bar code on the pre-personalized signature. The bar code information is transmitted to an ink jet printer to print name and address information to a magazine cover. The

personalized signature is not an optical disk and is part of the printed product such that it does not require being associated with the printed product.

In addition, there is no motivation or suggestion to combine the references. There is no suggestion in the references to combine the operations of a system that matches a credit card with a carrier and a printing system that generates magazines.

For these reasons, the references discussed above do not teach or suggest all of the claim limitations of claim 12. Therefore, it is submitted that claim 12 is allowable.

In view of the foregoing, Applicant respectfully requests reconsideration and withdrawal of the rejection of claim 12 and allowance of claim 12.

(8) Conclusion.

In view of the foregoing, reversal of the final rejection of claims 1-4, 6-9, 11-14, 21, and 22 and allowance of claims 1-4, 6-9, 11-14, 21, and 22 are respectfully requested.

Respectfully submitted,

A handwritten signature in black ink, appearing to read "Billie Jean Smith", with a stylized, cursive script.

Billie Jean Smith
Reg. No. 36,940

File No. 074077-9410-02
Michael Best & Friedrich LLP
100 East Wisconsin Avenue
Milwaukee, Wisconsin 53202-4108

(414) 271-6560

APPENDIX A

- 1 (Original). A method comprising:
writing electronic information to an optical disk on a binding line; and
associating the written optical disk with a printed product on the binding line.
- 2 (Original). The method of claim 1 wherein the optical disk includes at least one of a CD, CD-ROM and DVD.
- 3 (Original). The method of claim 1 and further including printing personalized indicia on the printed product in response to what was written to the optical disk.
- 4 (Original). The method of claim 3 wherein the step of printing personalized indicia occurs after associating the optical disk with the printed product.
- 5 (Withdrawn). The method of claim 3 wherein the step of printing personalized indicia occurs before associating the optical disk with the printed product.

6 (Original). A method comprising:

reading electronic information from an optical disk on a binding line; and
associating the optical disk with a printed product on the binding line.

7 (Original). The method of claim 6 wherein the optical disk includes at least one of a CD, CD-ROM and DVD.

8 (Original). The method of claim 6 and further including printing personalized indicia on the printed product in response to what was read from the optical disk.

9 (Original). The method of claim 8 wherein the step of printing personalized indicia occurs after associating the optical disk with the printed product.

10 (Withdrawn). The method of claim 8 wherein the step of printing personalized indicia occurs before associating the optical disk with the printed product.

11 (Original). A method comprising:

reading electronic information from an optical disk on a binding line wherein the optical disk has been electronically written offline with respect to the binding line; and
associating the optical disk with a printed product on the binding line.

12 (Original). The method of claim 11 and further including printing personalized information on the printed product based on the information read from the optical disk.

13 (Original). The method of claim 11 and further including assembling the printed product based on the information read from the optical disk.

14 (Original). The method of claim 11 wherein the information read from the optical disk includes personalized information.

15 (Withdrawn). A method comprising:
 writing electronic information to an optical disk on a finishing line;
 delivering a printed product to the finishing line;
 printing on the printed product based upon the electronic information written to the
optical disk; and
 associating the printed product and the optical disk on the finishing line.

16 (Withdrawn). The method of claim 15 wherein the printing is performed after the optical
disk is associated with the printed product.

17 (Withdrawn). The method of claim 15 wherein the optical disk is secured to the printed
product.

18 (Withdrawn). A method comprising:

reading electronic information to an optical disk on a finishing line;

delivering a printed product to the finishing line;

printing on the printed product based upon the electronic information read from the optical disk; and

associating the printed product and the optical disk on the finishing line.

19 (Withdrawn). The method of claim 18 wherein the optical disk is written with the electronic information off-line with respect to the finishing line.

20 (Withdrawn). The method of claim 18 wherein the electronic information is personalized information.

21 (Original). A method comprising:

- writing electronic information to an optical disk on a binding line;
- delivering a plurality of printed products to the binding line based upon the information written to the optical disk; and
- associating the printed product and the optical disk on the binding line.

22 (Original). A method comprising:

- reading electronic information from an optical disk on a binding line;
- delivering a plurality of printed products to the binding line based upon the information read from the optical disk; and
- associating the printed product and the optical disk on the binding line.